

# PATENT COOPERATION TREATY

## PCT

### INTERNATIONAL PRELIMINARY REPORT ON PATENTABILITY (Chapter I of the Patent Cooperation Treaty)

(PCT Rule 44bis)

Applicant's or agent's file reference CL2557PCT	<b>FOR FURTHER ACTION</b>		See item 4 below
International application No. PCT/US2005/013866	International filing date ( <i>day/month/year</i> ) 20 April 2005 (20.04.2005)	Priority date ( <i>day/month/year</i> ) 21 April 2004 (21.04.2004)	
International Patent Classification (8th edition unless older edition indicated) See relevant information in Form PCT/ISA/237			
Applicant E.I. DUPONT DE NEMOURS AND COMPANY			

1. This international preliminary report on patentability (Chapter I) is issued by the International Bureau on behalf of the International Searching Authority under Rule 44 bis.1(a).

2. This REPORT consists of a total of 5 sheets, including this cover sheet.

In the attached sheets, any reference to the written opinion of the International Searching Authority should be read as a reference to the international preliminary report on patentability (Chapter I) instead.

3. This report contains indications relating to the following items:

<input checked="" type="checkbox"/>	Box No. I	Basis of the report
<input type="checkbox"/>	Box No. II	Priority
<input type="checkbox"/>	Box No. III	Non-establishment of opinion with regard to novelty, inventive step and industrial applicability
<input type="checkbox"/>	Box No. IV	Lack of unity of invention
<input checked="" type="checkbox"/>	Box No. V	Reasoned statement under Article 35(2) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement
<input type="checkbox"/>	Box No. VI	Certain documents cited
<input type="checkbox"/>	Box No. VII	Certain defects in the international application
<input type="checkbox"/>	Box No. VIII	Certain observations on the international application

4. The International Bureau will communicate this report to designated Offices in accordance with Rules 44bis.3(c) and 93bis.1 but not, except where the applicant makes an express request under Article 23(2), before the expiration of 30 months from the priority date (Rule 44bis .2).

Date of issuance of this report 25 October 2006 (25.10.2006)
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Dorothée Mülhausen
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Form PCT/IB/373 (January 2004)

# PATENT COOPERATION TREATY

From the  
INTERNATIONAL SEARCHING AUTHORITY

REC'D 20 JUL 2005

PCT  
WIPO PCT

To:  
  
see form PCT/ISA/220

## WRITTEN OPINION OF THE INTERNATIONAL SEARCHING AUTHORITY (PCT Rule 43bis.1)

<p>Applicant's or agent's file reference see form PCT/ISA/220</p>			Date of mailing (day/month/year) see form PCT/ISA/210 (second sheet)
International application No. PCT/US2005/013866	International filing date (day/month/year) 20.04.2005	Priority date (day/month/year) 21.04.2004	
International Patent Classification (IPC) or both national classification and IPC B01J13/10			
Applicant E.I. DUPONT DE NEMOURS AND COMPANY			

**1. This opinion contains indications relating to the following items:**

- Box No. I Basis of the opinion
- Box No. II Priority
- Box No. III Non-establishment of opinion with regard to novelty, inventive step and Industrial applicability
- Box No. IV Lack of unity of Invention
- Box No. V Reasoned statement under Rule 43bis.1(a)(i) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement
- Box No. VI Certain documents cited
- Box No. VII Certain defects in the international application
- Box No. VIII Certain observations on the international application

**2. FURTHER ACTION**

If a demand for international preliminary examination is made, this opinion will usually be considered to be a written opinion of the International Preliminary Examining Authority ("IPEA"). However, this does not apply where the applicant chooses an Authority other than this one to be the IPEA and the chosen IPEA has notified the International Bureau under Rule 66.1b/s(b) that written opinions of this International Searching Authority will not be so considered.

If this opinion is, as provided above, considered to be a written opinion of the IPEA, the applicant is invited to submit to the IPEA a written reply together, where appropriate, with amendments, before the expiration of three months from the date of mailing of Form PCT/ISA/220 or before the expiration of 22 months from the priority date, whichever expires later.

- For further options, see Form PCT/ISA/220.
- For further details, see notes to Form PCT/ISA/220.

Name and mailing address of the ISA:



European Patent Office - P.B. 5818 Patentlaan 2  
NL-2280 HV Rijswijk - Pays Bas  
Tel. +31 70 340 - 2040 Tx: 31 651 epo nl  
Fax: +31 70 340 - 3016

Authorized Officer

Willsher, C

Telephone No. +31 70 340-2649



**WRITTEN OPINION OF THE  
INTERNATIONAL SEARCHING AUTHORITY**

International application No.  
PCT/US2005/013866

**Box No. I Basis of the opinion**

1. With regard to the language, this opinion has been established on the basis of the international application in the language in which it was filed, unless otherwise indicated under this item.

This opinion has been established on the basis of a translation from the original language into the following language , which is the language of a translation furnished for the purposes of international search (under Rules 12.3 and 23.1(b)).

2. With regard to any nucleotide and/or amino acid sequence disclosed in the international application and necessary to the claimed invention, this opinion has been established on the basis of:

a. type of material:

a sequence listing  
 table(s) related to the sequence listing

b. format of material:

in written format  
 in computer readable form

c. time of filing/furnishing:

contained in the international application as filed.  
 filed together with the international application in computer readable form.  
 furnished subsequently to this Authority for the purposes of search.

3.  In addition, in the case that more than one version or copy of a sequence listing and/or table relating thereto has been filed or furnished, the required statements that the information in the subsequent or additional copies is identical to that in the application as filed or does not go beyond the application as filed, as appropriate, were furnished.

4. Additional comments:

**WRITTEN OPINION OF THE  
INTERNATIONAL SEARCHING AUTHORITY**

International application No.  
PCT/US2005/013866

**Box No. V Reasoned statement under Rule 43bis.1(a)(i) with regard to novelty, inventive step or  
industrial applicability; citations and explanations supporting such statement**

**1. Statement**

Novelty (N)	Yes:	Claims	5-7
	No:	Claims	1-4,8-17
Inventive step (IS)	Yes:	Claims	
	No:	Claims	5-7
Industrial applicability (IA)	Yes:	Claims	1-17
	No:	Claims	

**2. Citations and explanations**

**see separate sheet**

**WRITTEN OPINION OF THE  
INTERNATIONAL SEARCHING  
AUTHORITY (SEPARATE SHEET)**

International application No.

PCT/US2005/013866

1. Reference is made to the following documents:

D1 = GB-A-1 483 542

D2 = US-A-4 062 799

D3= GB-A-1 483 303.

2. The subject-matter of present claims 1-4, 8-17 is known from D1 - see page 1, line 90 to page 2, line 16; page 2, line 117 to page 3, line 7; page 4, lines 65-81; page 4, line 97 to page 5, line 67; Examples 1, 2, 5; claims 1-17.
3. D2 is novelty-destroying for the subject-matter of present claims 1-4, 8-17 - see column 5, line 35 to column 7, line 28; column 7, line 34 to column 8, line 16; Example 8.
4. The disclosure in D3 at page 2, line 94 to page 3, line 65; page 6, line 118 to page 8, line 82; Example 13 is prejudicial to the novelty of the subject-matter of present claims 1-4, 8-17.
5. Claims 1-4, 8-17 do not fulfill the requirement of Article 33(2) PCT.
6. The subject-matter of present claims 5-7 does not appear to be involved in solving the technical problem posed in the application, and so no inventive step can be recognised.
7. Claims 5-7 are not allowable under Article 33(3) PCT.

# PATENT COOPERATION TREATY

From the  
INTERNATIONAL SEARCHING AUTHORITY

To:

see form PCT/ISA/220

REC'D 20 JUL 2005

PCT  
WIPO  
PCT

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Date of mailing  
(day/month/year) see form PCT/ISA/210 (second sheet)

Applicant's or agent's file reference see form PCT/ISA/220	FOR FURTHER ACTION See paragraph 2 below	
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International Patent Classification (IPC) or both national classification and IPC B01J13/10		
Applicant E.I. DUPONT DE NEMOURS AND COMPANY		

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For further options, see Form PCT/ISA/220.

**3. For further details, see notes to Form PCT/ISA/220.**

Name and mailing address of the ISA:   European Patent Office - P.B. 5818 Patentlaan 2 NL-2280 HV Rijswijk - Pays Bas Tel. +31 70 340 - 2040 Tx: 31 651 epo nl Fax: +31 70 340 - 3016	Authorized Officer  Willsher, C Telephone No. +31 70 340-2649
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PCT/US2005/013866

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International application No.  
PCT/US2005/013866

**Box No. V Reasoned statement under Rule 43bis.1(a)(i) with regard to novelty, inventive step or  
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**1. Statement**

Novelty (N)	Yes:	Claims	5-7
	No:	Claims	1-4,8-17
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	No:	Claims	5-7
Industrial applicability (IA)	Yes:	Claims	1-17
	No:	Claims	

**2. Citations and explanations**

**see separate sheet**

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